Assessing Bigfoot

Many people have reported seeing a large human-like ape in various parts of North America. Mostly it is known as Bigfoot, but there are many regional variations, including Sasquatch. There have been thousands of reported sightings over the past several decades. It is typically described as being quite large (8-10 feet tall and several hundred pounds), bipedal (walking on two legs), and hairy. It is almost always reported as being solitary, and many also report it as being omnivorous (e.g., eating stolen food from campsites and dumpsters) and nocturnal. It also typically flees when sighted. The name Bigfoot is derived from what many consider to be the most compelling physical evidence: very large, human-like footprints, usually in mud, often identified following an alleged sighting.

Most anthropologists doubt that such a creature really exists. Studies of nonhuman primate behavior simply do not support it. Of the approximately 500 species of primates, humans are the only one that is bipedal. Anthropologists have never found any kind of evidence of another primate that habitually walks upright. Reports of solitary behavior are troubling; being social is a characteristic of almost all primate groups. Orangutans are a rare exception, with males spending a significant amount of time alone, but even then the mother-and-child bond remains. In apes and humans, it is necessary for mothers to look after children for years, so we would expect that if Bigfoot did exist, it would be more likely that mothers with children, rather than solitary males, would be observed. Reports of Bigfoot being omnivorous are also troubling; large apes tend to be primarily folivorous (i.e., eating a diet of mainly leaves and other tough plant matter). Reports of being nocturnal are similarly problematic; most primate species are diurnal, and

those that are nocturnal tend to be small and are mostly classified as Strepsirhini—far removed from apes and humans.

There is no compelling biological evidence for the existence of Bigfoot. Claims that specimens contain Bigfoot DNA are occasionally reported, but when these are subjected to testing, they are invariably shown to be misidentified bears or other well-known animals, or hoaxes. No bones, teeth, or soft tissue have ever been discovered.

The knowledge that before the arrival of humans in North America, no other hominoid was ever here makes the notion that Bigfoot evolved here unlikely. There is virtually no fossil record of Bigfoot. Some believe that Bigfoot may be a remnant population of *Gigantopithecus*, a large ape that lived for a time in parts of Asia between about seven million and one million years ago. We have only mandibles (lower jaw) and teeth of *Gigantopithecus*, but based on these skeletal elements, it does appear to be a match in that it is a very large ape. We have no idea if *Gigantopithecus* was bipedal, though. Analysis of particles in the teeth suggest that *Gigantopithecus* ate a diet of plants, mostly bamboo.

Some who believe in Bigfoot suggest that the lack of a fossil record may be explained by Bigfoot deliberately burying their dead. This seems unlikely, however, because burial tends to improve preservation and archaeologists can often identify places where burials occur.

Believers should be aware that if they do sight Bigfoot, they should probably leave it alone. It probably isn't a large human-like ape. If it exists, it is probably a human who wants to be left alone. And nobody should do it harm. Recall that if a primate is bipedal, as Bigfoot is typically reported to be, it is classified as human.